The Big Stone Gap Post.

"KEEPING EVERLASTINGLY AT IT BRINGS SUCCESS."

VOL. I. BIG STONE GAP, WISE COUNTY, VA., THURSDAY, APRIL 27, 1893. NO. 21.

Stockholders' Meeting.

The annual meeting of the stockholders of the Gladeville Railroad Company will be held at the office of E. M. Fulton, Wise Court House, Va., on Monday, April 24th, 1893.

E. M. FULTON, President.

Stockholders' Meeting.

The annual meeting of the stock holders of Big Stone Gap Water Company will be held at the office of the said Company, in Big Stone Gap, Va., May 3rd 1893.

J. F. BULLITT, JR., President.
W. A. McDOWELL, Secretary.

Stockholders' Meeting.

The annual meeting of the stockholders of the Big Stone Gap Electric Light and Power Co., for the purpose of electing officers for the ensuing year, and to transact any other business that may be brought before them, will be held, Thursday, May 4, 1893, in the office of said company, at Big Stone Gap, Va.

JOS. L. KELLY, Sec.

Stockholders' Meeting.

The annual meeting of the Stockholders of the Central Land Company will be held in the Directors room of the Appalachian Bank, Big Stone Gap, Va., on Thursday, May the 4th, 1893, at two (2) o'clock p. m. Officers for the ensuing year and all other general business of the company will be transacted.

JAS. W. GEROW, President,
R. T. IRVINE, Secretary.

Stockholders' Meeting.

The annual meeting of the stockholders of the Big Stone Gap and Powell's Valley Railway Co., for the purpose of electing officers for the the ensuing year, and to transact any other business that may be brought before them, will be held Thursday, May 4th, 1893, in the office of said company, at Big Stone Gap, Va.

W. C. HARRINGTON, Sec.

Stockholders' Meeting.

A special meeting of the stockholders of the Big Stone Gap Building & Investment Company is hereby called to meet at the Appalachian Bank, Big Stone Gap, Va., on Wednesday, May 3rd 1893, at 2 o'clock p. m. The object of this meeting is to elect officers, supervise the accounts and condition of the company, and adopt such measures as may be deemed best for the general welfare of the company.

By order of the Board of directors.

R. T. IRVINE, President,
C. H. BERRYMAN, Secretary.

Stockholders' Meeting.

The annual meeting of the stockholders of the Appalachian Bank, of Big Stone Gap, Va., for the purpose of electing officers for the ensuing year, and to transact any other business that may be brought before them, will be held at 4 o'clock p. m., Monday, May 8th, 1893, in the offices of said bank.

W. A. McDOWELL, President.

Stockholders' Meeting.

The annual meeting of the Big Stone Gap Improvement Company will be held at the offices of the company, at Big Stone Ga,p Va., Wednesday, May 3rd, 1893, at which meeting a board of directors will be elected for the ensuing year.

R. A. AYERS, Pres't.

Stockholders' Meeting.

The annual meeting of the Stockholders of the Bank of Big Stone Gap, for the purpose of electing officers for the ensueing year, and to transact any other business that may be brought before them, will be held at four o'clock p. m., Tuesday May the the 2nd, 1893, in the office of said Bank.

H. H. BULLITT, Cashier.

Stockholders' Meeting.

The annual meeting of the Stockholders of the East Big Stone Gap Land and Improvement Company will be held in their office in the Harris building, Big Stone Gap, Va., on Thursday, May the 4th, 1893.

S. C. BERRYMAN, Secretary.

Disolution Notice.

The partnership heretofore existing between C. A. & A. W. Tracy, under the firm name of Tracy Bros. is this day disolved, C. A. Tracy retiring from same. All accounts against the firm will be settled by A. W. Tracy, who will also collect all amounts due said firm.

A. W. TRACY.
C. A. TRACY.

I will continue the business at the old stand, where I can be found ready to do good work and ask for a share of your patronage. I will do a general contract business in wood, stone and brick. Will also take contracts on grading, paving and plumbing.

A. W. TRACY.

Religion—What is It?

Editor Post:

In the POST I find an article on the subject of Religion, which I suppose to be from the able pen of the editor himself, and am somewhat impressed to give a few brief thoughts on this important question, though weak and imperfect as I feel. I will attempt or venture to give a few ideas relative to the eternal salvation of the soul of man.

This is a deep, mysterious subject, as there are two distinct salvations spoken of in the Bible—the common and eternal. The comnon salvation pertains to this life while the eternal alludes to eternity after death.

Now, the question arises, and is a controverted one by able divines and theologians, whether it be of the creature, man, or of God, or of both man and God. I believe, from Bible truths, it is wholy of God, from the fact that the carnal mind is at enmity with God and is not subject to the law of God, neither indeed can be.

The Apostle Paul says that in his flesh remains no good thing; so with the mind he serves the law of God and with the flesh the law of sin; for God is a spirit and seeketh such to worship Him as worship Him in spirit and in truth.

Then, eternal salvation is, by grace, a spiritual work, and not of any worth or merit on the creature's part. There is nothing that he can do or perform in any obedience or act of his own through which he obtains pardon or repentance or forgiveness of his sins; it is alone with Jesus, the Redeemer, the Savior—there being no other name given under Heaven whereby man can be saved. Then it is not in the name of man or the creature. So, to the proof and testimony:

Jesus says, in St. John 6th, xxxvii, "All that the Father giveth to me shall come to me, and him that cometh to me I will in no wise cast out."

Here is a gift of the Father, verse xliv, "No man can come to me except the Father which sent me draw him, and I will raise him up at the last day." Verse lxv: "And He said, 'therefore, said I unto you that no man can come unto me except it were given him of my Father.'" James says, "All the good and perfect gifts is from the Father of lights:" so here is set up unconditional salvation on the part of man. Then away with the doctrine of moral free agency to the proof and testimony.

Ephesians 2, viii, "For by grace are we saved through faith; that not of ourselves, it is the gift of God." Here self is excluded and the gift of God substituted. Not of works, lest any man should boast. Then, obedience is works. So, friends, where do we now stand? Works denied us and self set aside.

A little more proof: Second Timothy, 1, ix, "Who hath called us with an holy calling, not according to our works, but according to His own purpose and grace, which was given us in Christ Jesus before the world began;" and to Ephesians, 2, x, "For we are His workmanship, created in Christ Jesus unto good works," these good works being from God, as abundantly proven above.

Here comes in the most consoling of all the promises of God to His people; here comes "election and predestination"—the hated truth of Jesus ever since his visit here on earth. This is the most despised and hated of all the precions truths taught by Jesus, the apostles and holy prophets. To the proof and testimony, Ephesians 1, ii, "According as He hath chosen us in Him before the foundation of the world;" verse v, "Having predestinated us unto the adoption of children," etc.; verse ii, "In whom also we have obtained an inheritance, being predestinated according to the purpose of Him who worketh all things after the counsel of His own will."

Abundant is the proof on these points from Genesis to the end of Revelations. So, to be brief, we are asked by one, "Why is obedience so often spoken of and required?" In answer to this, Jesus came to seek and to save that which was lost, not for them to seek Him and to save themselves. He came to save His people from their sins. These gifts are of His Father, the Elect. Now, Jesus says to His redeemed, His elect children—here comes the "common salvation" of this life—for our good, for our peace, joy, happiness and pleasure in this life, and for our intelligence and high-standing in society, we must be obedient to His laws and commands, "knock and it shall be opened to you, seek and ye shall find."

The children of Israel were given an inheritance in this life—the land of Canaan—so, in disobedience, they were chastised, destroyed in the natural life; so the people of God to-day stand in the same light before the great God. They are punished and and chastised for their disobedience, some in one way and some in another. By disobedience and transgressions God's children form for themselves a hell on earth. The drunkard, the gambler and adulterer or fornicator is in a hell here on earth; he loses his character, his fortune, and he becomes sad and miserable. Obedience gives us the sweet repose and good will of God, society the peace and presence of a good conscience. I know the above is unpopular, but if it be a truth it should be set forth.

JAS. K. P. LEGG.

CRAB ORCHARD, VA.

What Is Put into a Blast Fuanace.

[Walter J. May.]

Although most people are acquainted with iron, steel, and other compounds of iron and other things, yet comparatively few know what is used to produce the metal or alloys, and fewer still know how the metal is produced from the "coal and other things" used. Of coure, those connected with the trade should know about the matter so far as the process of smelting is concerned, but away from the iron works labratory, even in the iron trade there are few who know the consituents of the various subtances used. As to the chemical changes which take place in converting the ore into metalic iron it is now intended to speak, but of course these are more affected by the character of the materials used, and to some extent the working of a furnace is affected by the condition of materials introduced.

Speaking roughly, steel is made from hematite ore, and much of the common ore, both cast and wrought, is made from ironstone, this substance being previously calcined to get rid of the carbonic acid which it contains. To flux the materials used, limestone is put into the furnace, while to supply both heat and carbon, coke is usually adopted medium, although charcoal is used to a small extent, our lack of available wood largely restricting its more general adoption. Of course the proportions of the various materials vary more or less, and it is quite apparent that the richer the ore the less quantity required, and vica versa, thus also causing some considerable variation in the total weights of materials put into the furnaces, so far as the solid matters are concerned, and the gaseous ones are not the subject of the present paper.

Taking coke first, this should of course be pure carbon, but in practice this theoretical excellence is never obtained, and from 4 to 10 per cent. of ash is usually present, many complaints being rife recently as to the lare percentage of ash present in coke of later years. Two reasons for complaint is presented when coke is rich in ash, as in the first place the carbon is reduced in quantity, and in the second the ash usually carries a lrage proportion of siliceous and aluminous insolubles, which necitates the use of limestone as a flux, while their presence also increases the slag and the consequent cost of handling. Washing being adopted in many places to free the coal from all but the fixed ash, and the Luhrig process proves very succesful in this place, as the dirt—"ash"—is removed with the minimum loss of coal, and practically the loss of coal amounts to only a few pounds in each hundred tons of crude slack treated. Besides the removal of the slag-forming insoluables, pyrites, which is the chief sulphur bearing element in coal, is removed, and washing therefore reduces the sulphur in the coke, by largely preventing its introduction.

Limestone usually contains siliceous insolubles, and these, of course, add to the slag, and also reduce the efficiency of limestone itself as a flux. This causes the election of limestone as free as possible from all siliceous and other insoluables, as slag is decided nuisance at most furnaces, and very considerable increases the costs which have to be borne by the pig iron. Of course phosphate limestone is usually carefully avoided, as more than sufficient phosphorous is generally present without adding more.

Coming to the ores used, they, of course, contain a larger or smaller amount of oxide or carbonate of iron and siliceous insolubles, these latter being chief slag producers. In addition, manganese, alumnia, and some other metalic elements may be present, the two former not being injurious, but we also get sulphur, phosphorous and titanic acid, which are not wanted. Lime and magnesia are also found in some ores, these, of course, being useful, but it is scarcely desireably to buy lime at 9s. or 10s. per ton when limestone can be obtained at 4s. per ton as a rule. The metallic value of the ore may be anywhere between 30 and 60 per cent. but as a rule, Spanish and British ores must be at least 50 per cent in metallic value sale, and iron stone is often higher than 50 per cent after calculation. Concentration is used to increase metallic values and reduce insolubles, and in this respect is very useful, but generally speaking phosphorous and sulphur is not reduced, save in the case of megnetic ores, the chief of these being megnetite, which is about the richest ore there is.

To show what is put into the furnace a few characteristic analyses may be interesting, and these are given below:

North Staffordshire ironstone gives the first example, and two anayses are shown:

Oxides of iron	95.31	93.42
Alumnia	0.49	0.62
Lime	2.17	3.96
Magnesia	0.25	0.24
Silica	1.68	1.76

These only show "traces" of phosphorous and sulphur and may be taken as very good. The next example are from Furness district, and show some of the best classes of hematite, and four analyses are given:

Peroxide of Iron	94.88	88.24	——	——
Sesquioxide of iron	——	——	78.61	86.20
Alumina	0.70	0.70	trace	0.43
Protoxide of magaese	0.04	0.28	0.24	trace
Lime	0.34	0.85	0.57	2.25
Mangnesia	trace	0.09	0.19	0.59
Water	0.47	2.28	0.02	3.35
Phosphoric acid	0.03	0.03	0.05	——
Phosphorous	——	——	0.01	——
Silica	4.55	12.46	9.04	0.08
Sulphuric acid	——	——	0.04	0.04
Carbonic acid	——	——	——	1.43
Insoluble residue	——	——	18.31	6.50

These ores are specially suitable for Bessemer pig iron, and are largely used at Barrow and other places. Coming to another class of ore, the Welsh carbonates are worth notice, of which two analyses are as follows:

Silica	4.60	25.20
Alumina	5.60	16.49
Carbonate of iron	80.22	48.50
Carbonate of lime	4.65	1.70
Carbonate of magnesia	2.91	6.00
Protoxide of manganese	1.02	0.32
Phosphoric acid	0.42	0.21
Bisulphide of iron	0.12	0.12
Potash	——	0.38
Organic matter and water	——	1.32

It will thus be seen that a very wide variety of elements are put into the furnace to produce pig iron, and on this point some remarks may at some future time be made. So far, however, it may be well to show what iron is made from, and while it may appear a simple matter to take up so much coke, limestone and ore to the top of the furnace and dump it in, while slag and metallic iron is drawn out at the base, yet it is very evident that some amount of "brains" are also requisite to secure the right proportions of the materials used.

Was There an Age of Copper?

M. Berthelot, the well-known French technicist, in a recent communication to the Academie des Sciences, states his belief in the sometime existence of an age of copper in addition to the three recognized archæological ones of stone, bronze (copper and tin) and iron. He bases his opinion chiefly upon analysis of a piece of copper which had been found by M. de Sarzee in the course of atiquarian investigation in Mesopotamia, or Al Jezira, as the Arabs designate the famous stretch of country between the Euphrates and the Tigris. The fragment thus chemically determined proves to have neither tin or zinc entering into its composition, there being simply trace of lead and arsenic. Water and the atmosphere had made ravages into the specimen, which was practically a suboxide or a compound of protoxide and metalic copper. As the ruins from which the piece of metal was taken are authoratively considered to be more ancient than even those of Babylon, Berthelot does not hesitate to promulgate the theory that an age of copper preceded the bronze and iron periods, especially as the examination of the component parts of a portion of a metalic scepter which, it is alleged, belonged to a Pharaoh who reigned in Egypt some 3500 years before Christ showed no sign of the presence of tin.

HAVE you paid your subscription?

FORESTY AND FINANCE.

Aaticle No. 2.

[Written for the Big Stone Gap Post, by J. AUSTIN SPERRY.]

Almost immediately following my communication on this subject to the POST there appeared an article in an afeternoon paper of this city seemingly in refutation. Its heading runs thus: "Trees not giving out—Some fallacies exploded by Henry Gannett of the Geological Survey—Forests grow faster than cut—Figures show that the timber area is as large to-day as when Columbus first landed." All of which is a tissue of mischevious absurdities.

While Mr. Gannett admits that forests in mountainous districts prevent the washing away of soil and the deposition of the detritus in valleys, thus preventing floods and accompanying disasters, he contends that the same influence is exerted by other and more useful forms of vegetation. Experience contradicts this. No forms of vegetation have been found to more than partially counteract the effects of extensive forest destruction.

But the climax of absurdity is reached in Mr. Gannett's distorted statistics. He asserts that our area of woodland produces each year 6,000,000,000 to 10,000,000,000 cubic feet more of timber than is removed by the ax. If this is true, the destruction of forests by natural causes must be more immense than we have had any conception of, for otherwise, instead of having "as great an area of woodland as when the white man set foot on our shores," the whole country, in the four hunded years that have elapsed, would have become an impossible and uninhabitable jungle. On the contrary, the fact which confronts us to-day is that hundreds of thousands of square miles of the area formerly covered by virgin forests are now cultivated farms and plantations, contributing by their products to the traffiic of great cities and towns; that, in spite of the development of innumerable mines of coal and iron, which replace wood in so many of the uses of mankind, the latter is becoming so scarce that the extinction of some of the more valuable species of merchantable trees is palpably in view.

Mr. Gannett concludes that "It is only in limited localities in the mountain region," such as those in the arid country where the conditions are not specially favorable to timber growth, that it seems worth while to attept to protect forests. Elsewhere they will protect themselves, and the protection will become more perfect as the timber product becomes more valuable."

This sounds plausable, and is especially encouraging to those speculators in timber whose self interest combines with their credulity in maintaining the theory of forest indestructibility.

As an instance of the protection afforded by the enhanced value of timber, take the example of a single species hard-wood—our black walnut. It succeeded mahogany in the manufacture of furniture, and in its turn is giving place to oak. It formerly abounded in all the middle and some of the Western states. Commercially, it is now practically extinct except in the corners of four states—the mountainous region of which Big Stone Gap is the center. And in this region it is hunted with as much eagerness and ferocity by the emissaries of distant lumber companies as lately was the buffalo on the Western plains; with what promises too, to be a like result—its utter extinction.

It is now selling in this market for twice the price of oak. Does its enhancing value give it any immunity from the cutter's exterminating ax? Not much!

During a couple of months' sojourn in Scott county last Fall, I was personally cognizant of a dozen parties whose quest was walnut lumber, and who captured many thousand valuable logs. The aggressive campaign has opened vigorously this spring, as I notice by anouncements in the local paper of the arrivals of Messrs. So-and-so, in quest of walnut lumber.

There is no way of heading off these exterminators except by enlightening the owners of our forest area on the great sacrifices they are making for a little present gain. The dime close to the eye obscures the almighty dollar beyound.

The Big Stone Gap POST of Jan. 26th ult. contained the following news item:

"It will be remembered that some time ago suit was instituted by Chicago parties against N. B. Dotson, of Wise C. H., to recover, as they claim, money advanced as first payment on a large lot of walnut timber, in Kentucky. They claim as the POST understand it, that they only examined eigty trees, and on them being represented to them as fair samples of the entire lot, the payment was made, and when they came to examine their puchase the other trees failed to be as represented; which brought about the action for recovery. Their representaives passed through town last Monday, en route to Kentucky, and had with him a Kodac manipulator, who will photograph the entire lot of trees—12,000 to 15,000—to be used as evidence in the case."

The amount of the money involved in this wholesale tree-slaughter job is not stated; but it is probable that 15,000 walnut trees, with the ax used as a cultivator and reaper, instead of an exterminator—that is cutting matured trees, and leaving the younger ones to mature in succession—would furnish annually, for many years, abundant supplies for an immense furniture and vencering establishment located at Big Stone Gap and commanding the market of the world. To be taken into the estimate is the value of the net crop annually from the uncut trees.

Even the most abundant of the hardwoods in this region are disappearing so rapidly under the present reckless process of cutting that any industries depending upon local suppies must be ephemeral.

It is ridiculous to say that forests grow faster than cut, in the face of the fact that the land cleared in a year cannot be reforested in less than half a century, either by natural growth or cultivation. The more valuable variety of trees cannot be matured in much less than a century.

We do not have to read between the lines of history to learn that ancient cities, once populous, prosperous and powerful, only flourishd while a well-wooded country was tributary to them, and that when the forests disappeared they became picturesque ruins in the midst of melancholly wilderness.

Gen. Ayers in his patriotic letter withdrawing from the gubernatorial candidacy, with happy epigrammatic force, alludes to Southwest Virginia as "materially the hope of the State." It is the hope of the State, not because of its mines of iron and coal, which are common to other sections, but because it possesses, according to the last Census Report, the only valuable hardwood forests remaining on the continent; which, preserved and properly utilized, may make it the richest province in the world.

Not that your superior mineral resources are undervalued. They are yours to stay. It is your priceless forests that are in danger. Upon their preservation depends the permanence of your prospective manufacturing industries. It is to be hoped that in regard to this treasure Southwest Virginia will not, "Like the base Judean, throw a pearl away richer than all his tribe."

In my former article I said that legislation, either state or national, could not preserve these grand old trees. Directly this is true. But indirectly both state and nation legislation can do much, by furnishing a sound and elastic currency, the expansion of which will relieve the pressing necessities of the owners of this invaluable woodland area, thus removing from them the temptation to sacrifice these trees for the pittance they will fetch at public vendue.

Therefore I have coupled Foresty and Finance as the suject of these essays. If they have the importance I attach to them, you of the press of that region, who, when you choose to exercise it, "have a voice protential, double as the duke's," should agitate the matter. If I am in error, you should do what Mr. Gannett, of the Geological Survey, has signally failed to do—explode the fallacies.

THE only way to keep a live paper is to support it liberally.